# Article 2. Specific Definitions

## §20164. Combined CIWMB & SWRCB Technical Definitions. [CIWMB T14:§17225.1-17225.74,§17258.2, 17761,18200.1, 18251,18011,18231,18281 // SWRCB C15: §2601]

*[Note: This section contains the SWRCB's and the CIWMB's technical definitions, combined and listed in alphabetical order. Each agency is responsible for adopting its own definitions within this combined listing. Those terms in this section that are followed by "(CIWMB)" are adopted by the CIWMB; those followed by "(SWRCB)" are adopted by the SWRCB. Unless otherwise stated in a given regulation, it is the intent of the SWRCB and CIWMB that each agency's definitions function for the other agency (e.g., when the CIWMB uses a term adopted by the SWRCB, or vice verse, the term has the same meaning as defined by the agency that adopted the term).]*

"**Abandoned site**" (CIWMB) means a site where there is no responsible party.

"**Abandoned Vehicles**" (CIWMB) includes vehicles, with or without motor power, including cars, trucks, trailers, mobile homes, buses, etc., left on public or private property for an extended period of time and usually in an inoperable or hazardous condition.

"**Acceptance for filing**" (CIWMB) means the enforcement agency has determined that the application package is complete and correct and the specified permit action time frames contained in Chapter 4 of this subdivision commence.

"**Active**" (CIWMB) for CIWMB promulgated sections means the period when waste is being accepted for disposal at a disposal site.

"**Active Face**" (CIWMB) means the working surface of a landfill upon which solid wastes are deposited during the landfill operation, prior to the placement of cover material.

"**Active life**" or "**operating life**" (SWRCB) means the period during which wastes are being discharged to a waste management unit. The active life continues until final closure of the waste management unit has been initiated pursuant to this subdivision. For surface impoundments, the active life includes any time when the impoundment contains liquid, including waste and leachate.

"**Affected medium**" (SWRCB) means any natural medium that consists of or contains waters of the state *(e.g., ground water, surface water, or the unsaturated zone)* that has been affected by a release from a waste management unit.

"**Agricultural Solid Wastes**" (CIWMB) include wastes resulting from the production and processing of farm or agricultural products, including manures, prunings and crop residues wherever produced.

"**Airport**" (CIWMB) means public-use airport open to the public without prior permission and without restrictions within the physical capacities of available facilities.

"**Alternative Daily Cover**" (CIWMB) see "cover material".

"**Annular Seal**" (CIWMB) the seal placed in the space between the casing in a well and the wall of the hole, or between two concentric strings of casing, or between casing and tubing.

"**Approval Agency**" (CIWMB) includes any agency with regulatory powers regarding solid waste generation, collection, transportation, processing or disposal and includes, but is not limited to the CIWMB, the Department of Toxic Substances Control, California Regional Water Quality Control Boards, local air districts, local enforcement agencies, local health entities and local land use authorities.

"**Approved closure plan**" (SWRCB) means the portion of a waste management unit's (Unit's) final closure and post-closure maintenance plan that describes all actions necessary to prepare the Unit for post-closure maintenance, and that has been approved by the RWQCB and by any other state and local agencies having purview over that plan.

"**Aquifer**" (SWRCB) means a geologic formation, group of formations, or part of a formation capable of yielding a significant amount of ground water to wells or springs.

"**Attitude**" (SWRCB) means either the orientation in space of a geologic structural feature or the structural element position of a geologic bed, stratum, fracture, or surface relative to the horizontal.

"**Background**" (SWRCB) means the concentrations or measures of constituents or indicator parameters in water or soil that has not been affected by waste constituents or leachate from the waste management unit being monitored.

"**Background Monitoring Point**" (SWRCB) (as capitalized) means a well, device, or location specified in the waste discharge requirements at which monitoring for background water quality or background soil quality is conducted.

"**Background plot**" (SWRCB) means an area adjacent to a land treatment unit that can reasonably be expected to have the same, or similar soil conditions as were present at the land treatment unit prior to discharges of waste.

"**Baling**" (CIWMB) includes the process of compressing and binding solid wastes.

"**Bench**" (CIWMB) means a terrace or comparatively level platform breaking the continuity of a slope.

"**Best management practice(s)**" (SWRCB) means a practice, or combination of practices, that is the most effective and feasible means of controlling pollution generated by nonpoint sources for the attainment of water quality objectives.

"**Bird hazard**" (CIWMB) means an increase in the likelihood of bird/aircraft collisions that may cause damage to the aircraft or injury to its occupants.

"**Bulky Waste**" (CIWMB) includes large items of solid waste such as appliances, furniture, large auto parts, trees, branches, stumps and other oversize wastes whose large size precludes or complicates their handling by normal collection, processing or disposal methods.

"**CAI Units**" (SWRCB) means waste management units that were closed, abandoned, or inactive prior to November 27, 1984.

"**Capillary force(s)**" (SWRCB) means the adhesive force between liquids and solids which, in the case of ground water hydrology, causes soil pore liquid to move in response to differences in matric potential. This effect causes ground water to rise from a saturated zone into the unsaturated zone, thereby creating a capillary fringe.

"**Cell**" (CIWMB) means that portion of compacted solid wastes in a landfill that is enclosed by natural soil or cover material during a designated period.

"**Certified Engineering Geologist**" (CIWMB) means a registered geologist, certified by the State of California, pursuant to section 7842 of the Business and Professions Code.

"**CIWMB**" (CIWMB) means the California Integrated Waste Management Board, which is the lead agency for implementing the State municipal solid waste permit program that is deemed to be adequate by US EPA under regulations published pursuant to sections 2002 and 4005 of RCRA.

"**Classified waste management unit**" or "**classified Unit**" (SWRCB) means a waste management unit (as defined in this section) that has been classified by a Regional Water Quality Control Board according to the provisions of Article 3 Subchapter 2, Chapter 3 of this division (§20240 et seq.).

"**Classified Unit**" **—** see "classified waste management unit" or "classified Unit"

"**CLGB**" **—** see "concentration limit"

"**Closed Site**" (CIWMB) means a disposal site that has ceased accepting waste and was closed in accordance with applicable statutes, regulations, and local ordinances in effect at the time.

"**Closure**" (SWRCB) means the process during which a waste management unit (Unit), or portion thereof, that is no longer receiving waste, is undergoing all operations necessary to prepare the Unit (or portion thereof, as appropriate) for post-closure maintenance in accordance with an approved plan for closure, or partial final closure as appropriate.

"**Closure plan**" (CIWMB) as used in this division refers to preliminary, final, and/or partial final closure plans as appropriate.

"**COC**" or "**COCs**" **—** see "Constituents Of Concern"

"**Coefficient of variation**" (SWRCB) means the standard deviation divided by the mean. It is a statistical measure of the dispersion of individual samples relative to the mean value of the samples.

"**Collection**" (CIWMB) means the act of collecting solid waste at the place of waste generation by an approved collection agent (public or private) and is distinguished from "removal."

"**Collection Vehicle or Equipment**" (CIWMB) includes any vehicle or equipment used in the collection of residential refuse or commercial solid wastes.

"**Commercial Solid Wastes**" (CIWMB) include all types of solid wastes generated by stores, offices and other commercial sources, excluding residences, and excluding industrial wastes.

"**Concentration limit**" (SWRCB) means the value for a constituent specified in the water quality protection standard under §20390 and §20400, including but not limited to values for concentration, temperature, pH, conductivity, and resistivity. The term can apply to a concentration that exceeds the constituent's background concentration [i.e., a "concentration limit greater than background (CLGB)" (SWRCB) as described under §20400].

"**Concentration limit greater than background** (**CLGB**)" **—** see "concentration limit"

"**Confined animal facility**" (SWRCB) means any place where cattle, calves, sheep, swine, horses, mules, goats, fowl, or other domestic animals are corralled, penned, tethered, or otherwise enclosed or held and where feeding is by means other than grazing.

"**Constituent**" (SWRCB) means an element or compound which occurs in or is likely to be derived from waste discharged to the waste management unit.

"**Constituent(s) of concern**" or "**COC(s)**" (SWRCB) means any waste constituent(s), reaction product(s), and hazardous constituent(s) that is reasonably expected to be in or derived from waste contained in a waste management unit.

"**Construction and Demolition Wastes**" (CIWMB) include the waste building materials, packaging and rubble resulting from construction, remodeling, repair and demolition operations on pavements, houses, commercial buildings and other structures.

"**Construction quality assurance**" or "**CQA**" (SWRCB) means a planned system of activities that provides assurance that the facility, or component thereof, is constructed as specified in the approved design. As used in these regulations, the term includes "**Construction quality control**" or "**CQC**", a planned system of inspections that is used to directly monitor and control the quality of a construction project.

"**Containment**" (SWRCB) means the use of waste management unit characteristics or installed systems and structures to prevent or restrict the release of waste constituents, including waste constituents mobilized as a component of leachate or of landfill gas.

"**Containment feature**" (SWRCB) means any feature, whether natural or artificial, used to contain waste constituents, including waste constituents mobilized as a component of leachate or of landfill gas.

"**Containment structure**" (SWRCB) means an artificial feature designed and installed to contain waste constituents, including waste constituents mobilized as a component of leachate or of landfill gas.

"**Contaminated materials**" (SWRCB) means materials that contain waste constituents or leachate.

"**Control chart**" (SWRCB) means a graphical method for evaluating whether a process is or is not in a state of statistical control.

"**Coverage**" (SWRCB), when applied to financial assurance, means the amount of funds the discharger must make available for a known eventuality (e.g., closure) or potential eventuality (e.g., corrective action).

"**Cover Material**" (CIWMB) means soils/earthen materials or alternative materials used in covering compacted solid wastes in a disposal site. Cover material may serve as daily, intermediate or final cover. "**Alternative Daily Cover**" (CIWMB) means cover material other than at least six inches of earthen material, placed on the surface of the active face at the end of each operating day to control vectors, fires, odors, blowing litter, and scavenging. "**Daily Cover Material**" (CIWMB) includes that cover material placed on the entire surface of the active face at least at the end of each operating day in order to control vectors, fire, odors, blowing litter and scavenging. "**Final Cover Material**" (CIWMB) means cover material that represents the permanently exposed final surface of a fill. "**Intermediate Cover Material**" (CIWMB) means cover material placed on all fill surfaces where additional cells are not to be constructed for 180 days or more to control vectors, fires, odors, blowing litter, scavenging, and drainage. Intermediate cover does not include final cover as defined in this section.

"**CQA**" **—** see "construction quality assurance"

"**CQC**" **—** refer to "construction quality assurance"

"**Critical Slope**" (SWRCB) means a potential slip surface or slope on a site that has the lowest factor of safety.

"**Cross contamination**" (SWRCB) means a condition created when a drill hole, boring, or improperly constructed well forms a pathway for fluid movement between a saturated zone which contains pollutants and a formerly separated saturated zone containing uncontaminated ground water.

"**Cutoff wall**" (SWRCB) means a subsurface barrier to lateral fluid movement which extends from in place natural geologic materials (which have the required hydraulic conductivity) to ground surface.

"**Day**" (CIWMB) means calendar day unless otherwise specified.

"**Dead Animals**" (CIWMB) include those animals whose carcasses or parts thereof require disposal.

"**Decomposable waste**" (SWRCB) means waste which, under suitable natural conditions, can be transformed through biological and chemical processes into compounds which do not impair the quality of waters of the state. Nevertheless, incomplete decomposition may result in some water quality degradation *(e.g., hardness, taste, odor, etc.)*.

"**Decomposition Gases**" (CIWMB) include gases produced by chemical or microbial activity during the decomposition of solid waste.

"**Dedicated**" (SWRCB), when applied to a waste management unit (Unit), means the Unit is used exclusively for discharges of particular wastes.

"**Dendritic**" (SWRCB) when applied to a waste management unit's subdrain system, means that this system is arranged in a branching pattern.

"**Designated waste**" (SWRCB) has the same meaning as under California Water Code §13173.

"**Dewatered sludge**" (SWRCB) means residual semi solid waste from which free liquid has been evaporated or otherwise removed.

"**Discharger**" (SWRCB) means any person who discharges waste which could affect the quality of waters of the state, and includes any person who owns a waste management unit (Unit) or who is responsible for the operation of a Unit. When referring to dischargers of hazardous waste, the terms "discharge" and "waste" in this definition have the same meaning as they would have under the definitions for these terms provided in section 66260.10 of Chapter 11 of Division 4.5 of Title 22, CCR, effective July 1, 1991.

"**Discrete unit**" (CIWMB) means any portion of the disposal area that can be individually monitored.

"**Disposal Area**" (CIWMB) [CIWMB usage] means that portion of a disposal site which has received or is receiving solid wastes.

"**Dump**" (CIWMB) means a disposal site which has waste exposed to the elements, vectors and scavengers.

"**Dynamic Conditions**" (CIWMB) means under transitory loading conditions, such as during an earthquake.

"**EA**" (CIWMB) means enforcement agency as defined in PRC §40130.

"**Earthquake Magnitude**" (CIWMB) means the Richter scale of earthquake magnitude used to express the total energy of an earthquake.

"**Electrical conductivity**" (SWRCB) means the relative ability of water to conduct electrical current. It depends on the ion concentration of, and can be used to approximate the total filterable residue (total dissolved solids) in, the water.

"**Environmental Control System**" (CIWMB) means a system to prevent the release of waste constituents from the containment structures of sites. Environmental control system for the purpose of this definition does not include systems which primary function is to protect water quality.

"**Excess exposure**" (SWRCB) means that, for an organism exposed to a release from a waste management unit, the combined effect of all hazardous constituents in the organism's environment is such that the organism will suffer some measurable adverse effect on health or reproductive success, which effect is partly or wholly attributable to the release.

"**Existing**" (SWRCB), when describing a waste management unit *(e.g., "existing surface impoundment", or "existing Unit")*, means that the waste management unit in question was operating, or had received all permits necessary for construction and operation, on or before November 27, 1984, pursuant to §20080(d).

"**Existing Footprint**" (SWRCB) (as capitalized) means the area of land, at an MSW landfill, that is covered by waste as of the date that landfill became subject to the federal regulations of 40 CFR Part 258, pursuant to §258.1 of that part, as published in the Federal Register of October 1, 1993 (Volume 58, No. 189, pages 51546 and 51547). *[Note: see also definitions for "Federal Deadline" and "MSW landfill".]*

"**Existing MSWLF unit**" (CIWMB) means any municipal solid waste landfill unit that is receiving solid waste as of the appropriate dates specified in Section 20060. Waste placement in existing units must be consistent with past operating practices or modified practices to ensure good management.

"**External hydrogeologic forces**" (SWRCB) means seasonal and other fluctuations in ground water levels, and any other hydraulic condition which could cause a change in the hydraulic stress on a containment structure.

"**Facility**" **—** see "waste management facility"

"**Facility Boundary**" (CIWMB) means the boundary surrounding the entire area on which solid waste facility activities occur and are permitted.

"**Facility wastewater**" (SWRCB) means all wastewater, from whatever source, produced at a confined animal facility.

"**Factor of safety**" (SWRCB) means the ratio of forces resisting slope or foundation failure over forces driving slope or foundation failure.

"**Federal Deadline**" (SWRCB) applies only to an MSW landfill, and means the compliance date applicable to that landfill or portion thereof pursuant to §258.1(e) of the federal MSW regulations (40CFR258), as revised in the Federal Register of October 1, 1993 (Volume 58, No. 189, pages 51546 and

51547). The term does not mean the date an MSW landfill must begin monitoring, in that all waste management units subject to these regulations have been required to monitor since the November 27, 1984 version of these regulations (see §20380 et seq.).

"**Fill**" (CIWMB) includes compacted solid waste and cover material.

"**Flexible membrane liner (FML)**" **—** see "geosynthetic(s)"

"**Floodplain**" (SWRCB) means the land area which is subject to flooding in any year from any source.

"**FML**" **—** see "geosynthetic(s)"

"**Foundation Failure**" (CIWMB) means the failure of a foundation, soil or rock that serves to support an imposed load, along a surface of weakness.

"**Freeboard**" (SWRCB) means the vertical distance between the lowest point along the top of a surface impoundment dike, berm, levee, or other similar feature and the surface of the liquid contained therein.

"**Free liquid**" (SWRCB) means liquid which readily separates from the solid portions of waste under ambient temperature and pressure. Free liquids are not present when a 100 milliliter representative sample of the waste can be completely retained in a standard 400 micron conical paint filter for 5 minutes without loss of any portion of the waste from the bottom of the filter (or an equivalent test approved by the Department of Toxic Substances Control).

"**Garbage**" (CIWMB) includes all kitchen and table food waste, and animal or vegetable waste that attends or results from the storage, preparation, cooking or handling of food stuffs.

"**Geologic materials**" (SWRCB) means in place naturally occurring surface and subsurface rock and soil.

"**Geologist**" (CIWMB) means a person who is engaged in professional geological work under the supervision of registered geologist or registered civil engineer, who is in responsible charge of the work, pursuant to section 7805 of the Business and Professions Code.

"**Geomembrane**" **—** see "geosynthetic(s)"

"**Geosynthetic(s)**" (SWRCB) (n) means flexible materials in planar form manufactured to meet specific engineering purposes. The term includes, but is not limited to: "**geomembrane**", an essentially impermeable membrane used as a barrier to waste solids and fluids, and synonymous with "**synthetic liner**" and "**flexible membrane liner (FML)**" ; "**geocomposite liner** (**GCL**)," a manufactured material using geotextiles, geogrids, geonets, and/or geomembranes in laminated or composite form; "**geotextile**" (including "**geonet**"), any permeable textile used with foundation, soil, rock, earth, or any other geotechnical engineering-related material as an integral part of a constructed project, structure, or system.

"**Ground acceleration**" (SWRCB) means acceleration of earth particles caused by an earthquake.

"**Ground rupture**" (SWRCB) means disruption of the ground surface due to natural or man made forces (e.g., faulting, landslides, subsidence).

"**Ground water**" (SWRCB) for the purpose of the SWRCB-promulgated requirements of this subtitle, means water below the land surface that is at or above atmospheric pressure.

"**Grout curtain**" (SWRCB) means a subsurface barrier to fluid movement, installed by injecting grout mixtures (such as cement, silicates, synthetic resins, etc.) to fill and seal fractures in rock.

"**Hazardous constituent**" (SWRCB) means a constituent identified in Appendix VIII to Chapter 11 of Division 4.5 of Title 22, CCR, or an element, chemical compound, or mixture of compounds which is a component of a waste or leachate and which has a physical or chemical property that causes the waste or leachate to be identified as a hazardous waste by the California Department of Toxic Substances Control.

"**Hazardous waste**" (SWRCB) means any waste which, under Article 1, Chapter 11, Division 4.5 (§66261.3 et seq.) of Title 22 of this code, is required to be managed according to Division 4.5 of Title 22 of this code.

"**Head**" or "**hydraulic head**" (SWRCB) means the pressure exerted by fluid on a given area. It is caused by the height of the fluid surface above the area.

"**Holding facilities**" (CIWMB) means sedimentation basins/ponds designed to control suspended solids entrained in surface run-off, prior to discharge.

"**Holocene fault**" (SWRCB) means a fault which is or has been active during the last 11,000 years.

"**Household waste**" (CIWMB) means any solid waste (including garbage, trash, and sanitary waste in septic tanks) derived from households (including single and multiple residences, hotels and motels, bunkhouses, ranger stations, crew quarters, campgrounds, picnic grounds, and day use recreation areas).

"**Hydraulic conductivity**" (SWRCB) means the ability of natural and artificial materials to transmit fluid. For water, including aqueous solutions, the term is expressed as a measure of the rate of flow (e.g., cubic centimeters per second) one can expect through a unit-area (e.g., one square centimeter) cross section

of the material when the hydraulic gradient is unity (e.g., one centimeter of head loss per centimeter of travel through the material). The resulting numerical value is expressed in velocity units (e.g., centimeters per second).

"**Illegal Site**" (CIWMB) means a disposal site that is not permitted and not exempt from obtaining a permit and is not closed or excluded from the requirement to obtain a SWFP.

"**Inactive**" (SWRCB) means a temporary status of a waste management unit (Unit), following the initial receipt of waste, in which the Unit is no longer receiving waste.

"**Inactive mining waste management unit**" (SWRCB) means any area containing mining wastes which is located at a present or former mining or milling site, and where all mining operations and discharges of mining waste ended and have not been resumed for 5 years, or more.

"**Inactive Site**" (CIWMB) means a site that is temporarily idle for a specific period due to known circumstances and not part of the normal operation pattern contained in the solid waste facility permit.

"**Incinerator**" (CIWMB) includes any equipment used for the volume reduction or destruction of combustible wastes by burning, from which the exhaust gases pass through a flue.

"**Incinerator Residue**" (CIWMB) includes the solid materials remaining after reduction in an incinerator.

"**Independent sample**" (SWRCB) means an individual sample of a monitored medium, obtained from a given Monitoring Point, that:

(1) does not contain a parcel of the medium that has been previously sampled at that Monitoring Point sufficient to cause a measurable effect in the analytical results; and
(2) has not been otherwise affected differently than any other individual sample or group of samples with which it will be compared.

In applying No. 1, above, to ground water monitoring, the parcel of water of interest is the parcel of water that was in the well bore at the time of any previous sampling event.

"**Indicator parameters**" (SWRCB) means measurable physical or chemical characteristics of water or soil pore moisture which are used to detect the presence of waste constituents in water or soil pore moisture, or the effects of waste constituents on waters of the state.

"**Industrial Wastes**" (CIWMB) include all types of solid wastes and semi solid wastes which result from industrial processes and manufacturing operations.

"**Inert waste**" (SWRCB) means the same as under §20230(a).

"**Interim cover**" (SWRCB) means the same as under §20705(a).

"**Intermediate cover**" (SWRCB), when used in an SWRCB-promulgated requirement applicable to a waste pile waste management unit, has a meaning identical to the CIWMB's definition of the term as it applies to landfills *(under the definition for "cover material" in this section).*

"**Iso-settlement map**" (SWRCB) means a contour map showing lines of equal settlement of a landfill over a period of time.

"**Land application unit**" (CIWMB) means an area where wastes are applied onto or incorporated into the soil surface (excluding manure spreading operations) for agricultural purposes or for treatment and disposal.

"**Landfill**" (SWRCB) means a waste management unit at which waste is discharged in or on land for disposal. It does not include surface impoundment, waste pile, land treatment unit, injection well, or soil amendments. *[Note: see also the definition of "waste management unit" and §§20090(c&f).]*

"**Landfill gas condensate**" (SWRCB) means liquids which are removed from a gas control system at a landfill and which are produced by the condensation of landfill gas being conveyed by that system. The term ceases to apply to such liquid upon its being treated to the extent that it no longer contains any constituent of concern whose concentration exceeds the water quality objectives of ground water in the uppermost aquifer underlying the waste management unit. *[Note: see also §20200(d).]*

"**Land treatment unit**" (SWRCB) means a waste management unit (Unit) at which liquid and solid waste is discharged to, or incorporated into, soil for degradation, transformation, or immobilization within the treatment zone. Such Units are disposal Units if the waste will remain after closure. *[Note: see also the definition of "waste management unit" and §20090(f).]*

"**Lateral expansion**" (CIWMB) means a horizontal expansion beyond the disposal area boundary.

"**Lateral expansion (beyond Existing Footprint)**" (SWRCB) applies only to an existing MSW landfill that is subject to the federal regulations under 40 CFR 258, and means any portion of the landfill which—in

map view—is contiguous with the landfill's Existing Footprint (as defined in this section) and which receives waste after the landfill's Federal Deadline (as defined in this section).

"**Lateral expansion (of RWQCB-Permitted Area)**" (SWRCB), for any new or existing waste management unit (Unit), means any increase ,in map view, of the Unit's RWQCB-Permitted Area (as defined in this section)

"**LCRS**" **—** see "leachate collection and removal system"

"**Leachate**" (SWRCB) means any liquid formed by the drainage of liquids from waste or by the percolation or flow of liquid through waste. It includes any constituents extracted from the waste and dissolved or suspended in the fluid. The term ceases to apply to such liquid upon its being mingled with ground water outside the Unit's liner system. The term also ceases to apply to such liquid upon its being treated to the extent that it no longer contains any constituent of concern whose concentration exceeds the water quality objectives of ground water in the uppermost aquifer underlying the waste management unit.

"**Leachate collection and removal system**" or "**LCRS**" (SWRCB) means that portion of a waste management unit's containment system that is designed and constructed (pursuant to §20340) to collect all leachate that reaches it, and to convey such leachate to a designated collection area to minimize the buildup of leachate head on any underlying liner. The term does not include systems that are designed to collect ground water outside the Unit's liner, if any, including ground water that has been polluted by leachate.

"**Liner**" (SWRCB) means a continuous layer of natural or artificial material, or a continuous membrane of flexible artificial material, or a continuous composite layer consisting of a membrane of flexible artificial material directly overlying a layer of engineered natural material, which is installed beneath or on the sides of a waste management unit (Unit), and which acts as a barrier to both vertical or lateral fluid movement.

"**Liner system**" (SWRCB) means the entire sequence of individual liners, composite liners, and leachate collection system(s) which prevent or minimize releases from the waste management unit.

"**Liquefaction**" (SWRCB) means the process resulting from seismic or other shaking whereby solid granular material takes on the flowing characteristics of a liquid.

"**Liquid waste**" (SWRCB) means any waste materials which are not spadable.

"**Litter**" (CIWMB) means all solid waste which has been improperly discarded at any location or which has migrated by wind or equipment away from the unloading area of a solid waste facility, disposal site or operation. Litter includes, but is not limited to, convenience food, beverage, and other product packages or containers constructed of steel, aluminum, glass, paper, plastic, and other natural and synthetic materials, thrown or deposited on the lands and waters of the state, but not including the properly discarded waste of the primary processing of agriculture, mining, logging, sawmilling, or manufacturing.

"**Local Air District**" (CIWMB) means the local Air Quality Management District (**AQMD**) or the local Air Pollution Control District (**APCD**).

"**Local Government**" (CIWMB) is a local public entity which is a county, city, district, or any other special political subdivision, but is not the State.

"**Manure**" (SWRCB) means the accumulated moist animal excrement that does not undergo decomposition or drying as would occur on open grazing land or natural habitat. This definition shall include feces and urine which may be mixed with bedding materials, spilled feed, or soil.

"**Maximum credible earthquake**", or "**MCE**" (SWRCB), means the maximum earthquake that appears capable of occurring under the presently known geologic framework. In determining the maximum credible earthquake, little regard is given to its probability of occurrence except that its likelihood of occurring is great enough to be of concern. The term describes an event that could be approached more frequently in one geologic environment than in another; therefore, the following factors have a bearing upon the derivation of the MCE for any given facility:

(a) the seismic history of the vicinity and of the geologic province;

(b) the length of the significant fault or faults which can affect the site within a radius of 62 miles (100 kilometers) of the facility boundary;

(c) the type(s) of faults involved;

(d) the tectonic and/or structural history; and

(e) the tectonic and/or structural pattern or regional setting (geologic framework); nevertheless

(f) the time factor shall not be a parameter.

"**Maximum probable earthquake**", or "**MPE**" (SWRCB), means the maximum earthquake that is likely to occur during a 100 year interval. The term describes a probable occurrence, rather than an assured

event that will occur at a specific time; therefore, the following factors have a bearing upon the derivation of the MPE for a given facility:

(a) the regional seismicity, considering the known past seismic activity;
(b) the fault or faults within a 62 mile (100 kilometer) radius from the facility boundary that may be active within the 100 years following first acceptance of waste;
(c) the type(s) of faults considered;
(d) the seismic recurrence factor for the area described in ¶(b), above, and for any faults (when known) within that area; and
(e) the mathematic probability analysis (or statistical analysis) of seismic activity associated with the faults included in the area described under ¶(b), above, including a graphical plot of recurrence information.

Nevertheless, the postulated magnitude of the MPE is superseded by any more powerful seismic event that has occurred within historic time in the area described under ¶(b), above.

"**Measurably significant**" (SWRCB) means a change in the Monitoring Point data that, relative to the reference background value (or other approved reference value or distribution), is sufficient to indicate that a release has occurred, pursuant to the applicable data analysis method (including its corresponding trigger).

"**Medical Waste**" (CIWMB) means waste regulated pursuant to the Medical Waste Management Act, Part 14 (commencing with Section 117600) of Division 104 of the Health and Safety Code.

"**Mining waste**" (SWRCB) means all waste materials (solid, semi solid, and liquid) from the mining and processing of ores and minerals including soil, waste rock, and other forms of overburden as well as tailings, slag, and other processed mining wastes.

"**Moisture holding capacity**" (SWRCB) means the amount of liquid which can be held against gravity by waste materials without generating free liquid.

"**Monitoring parameter**" (SWRCB) means one of the set of parameters specified in the waste discharge requirements for which monitoring is conducted. Monitoring parameters include physical parameters, waste constituents, reaction products, and hazardous constituents, that provide a reliable indication of a release from a waste management unit.

"**Monitoring Poin**t" (SWRCB) (as capitalized) means a well, device, or location specified in the waste discharge requirements at which monitoring is conducted and at which the water quality protection standard, under §20390, applies.

"**MSW landfill**" or "**municipal solid waste landfill unit**" (SWRCB) means any landfill that is subject to the federal regulations of 40CFR258, including any portion of a disposal site that is subject to those regulations. The term includes any landfill, other than a Class I landfill, that received municipal solid waste (**MSW**) at any time and that has received any solid waste since October 9, 1991; therefore, the term does not include any landfill that stopped receiving waste prior to that date.

"**Municipal solid waste**," or "MSW" (SWRCB) has the same meaning as under 40 CFR Part 258.

"**New Unit**" (SWRCB), when applied to a waste management unit (**Unit**) or portion thereof, means that the Unit (or portion thereof) began operating, or had received all permits necessary for construction and operation, after November 27, 1984, pursuant to §20080(d).

"**New MSWLF unit**" (CIWMB) means any municipal solid waste landfill unit that has not received waste prior to the operative date of October 9, 1993, or prior to October 9, 1997 if the MSWLF unit meets the conditions of 40 CFR 258.1(f)(1).

"**Nonhazardous solid waste**" (SWRCB) has the same meaning as under §20220(a).

"**Nuisance**" (SWRCB) has the same meaning as under Water Code §13050(m).

"**Nuisance**" (CIWMB) for CIWMB-promulgated sections includes anything which is injurious to human health or is indecent or offensive to the senses and interferes with the comfortable enjoyment of life or property, and affects at the same time an entire community, neighborhood, household or any considerable number of persons although the extent of annoyance or damage inflicted upon an individual may be unequal and which occurs as a result of the storage, removal, transport, processing or disposal of solid waste.

"**On-site**" (CIWMB) means located within the permitted boundary.

"**Open burning**" (CIWMB) means the combustion of solid waste without:

(1) Control of combustion air to maintain adequate temperature for efficient combustion,

(2) Containment of the combustion reaction in an enclosed device to provide sufficient residence time and mixing for complete combustion, and
(3) Control of the emission of the combustion products.

"**Operating**" (CIWMB) means currently active or the period of site activity from the first receipt of waste until the final receipt of waste consistent with the normal pattern of operation in the solid waste facility permit.

"**Operating**" (SWRCB) **—** see "active life"

"**Operating Area**" (CIWMB) means that portion of a solid waste facility which is currently in use for the unloading, management or disposal of wastes.

"**Operating life**" **—** see "active life"

"**Operator**" (CIWMB) means the landowner or other person who through a lease, franchise agreement or other arrangement with the landowner becomes legally responsible to the State for including, but not limited to, the following requirements for a solid waste facility or disposal site:
(A) obtaining a solid waste facility permit;
(B) complying with all applicable federal, state and local requirements;
(C) the physical operation of the facility or site; and
(D) closing and maintaining the site during the postclosure maintenance period.

"**Overpulling**" (CIWMB) means excessive air intrusion into a disposal site during gas extraction to control the migration of landfill gas or to increase the production of landfill gas in an energy production system or flare.

"**Partial Final Closure**" (CIWMB) means the closure of discrete units of a site consistent with the approved closure and postclosure maintenance plan.

"**Peak stream flow**" (SWRCB) means the maximum expected flow of surface water at a waste management facility from a tributary watershed for a given recurrence interval.

"**Peer-reviewed**" (CIWMB) means published and independently reviewed by other experts within the same academic field.

"**Perched ground water**" (SWRCB) means a body of unconfined ground water separated from the zone of saturation by a portion of the unsaturated zone. Such perched water can be either permanent or ephemeral.

"**Pereability**"(SWRCB) means the ability of natural and artificial materials to transmit fluid.

"**Physical parameter**"(SWRCB) means any measurable physical characteristic of a substance including, but not limited to, temperature, electrical conductivity, pH, and specific gravity.

"**Point of Compliance**" (SWRCB) (as capitalized) means a vertical surface located at the hydraulically downgradient limit of a waste management unit (Unit) and that extends through the uppermost aquifer underlying the Unit.

"**Post closure maintenance**" (SWRCB) means all activities undertaken at a closed waste management unit to maintain the integrity of containment features and to monitor compliance with applicable performance standards.

"**Post closure maintenance period**" (SWRCB) means the period after closure of a waste management unit (Unit) during which the waste in the Unit could have an adverse effect on the quality of the waters of the state.

"**Postclosure maintenance plan**" (CIWMB) as used in this division refers to preliminary, final, and/or partial final postclosure maintenance plans as appropriate.

"**Premises**" (CIWMB) includes a tract or parcel of land with or without habitable buildings or appurtenant structures.

"**Principal Gases**" (CIWMB) means the organic or inorganic constituents of landfill gas, greater than one percent by volume, that typically include carbon dioxide, methane, oxygen, and nitrogen.

"**Private Access**" (CIWMB) means that public access and disposal are not allowed.

"**Probable maximum precipitation**" (SWRCB) means the estimated amount of precipitation for a given duration, drainage area, and time of year, which approaches and approximates the maximum that is physically possible within the limits of contemporary hydrometeorological knowledge and techniques. The term describes a precipitation event that has virtually no risk of being exceeded.

"**Professional Land Surveyor**" (CIWMB) means a land surveyor licensed by the State of California pursuant to section 8747 of the Business and Professions Code.

"**Putrescible Wastes**" (CIWMB) include wastes that are capable of being decomposed by micro organisms with sufficient rapidity as to cause nuisances because of odors, gases or other offensive conditions.

"**P value**" (SWRCB) means the smallest significance level for which the null hypothesis would be rejected, based on the data that was actually observed.

"**Rapid geologic change**" (SWRCB) means alteration of the ground surface through such actions as landslides, subsidence, liquefaction, and faulting.

"**R Chart (range chart)**" (SWRCB) means a control chart for evaluating the variability within a process in terms of the subgroup range R.

"**Reconstruction**" (SWRCB) means modification to an existing waste management unit (Unit) which entails costs amounting to 50 percent or more of the initial cost of the Unit.

"**Refuse**" (CIWMB) includes garbage and rubbish.

"**Regional Water Quality Control Board**" **—** see "RWQCB"

"**Registered Civil Engineer**" (CIWMB) means a civil engineer registered by the State of California, pursuant to section 6762 of the Business and Professions Code.

"**Registered Geologist**" (CIWMB) means a geologist registered by the State of California, pursuant to section 7842 of the Business and Professions Code.

"**Regulated Hazardous Waste**" (CIWMB) means a hazardous waste, as defined in §66260.10 of Division 4.5 of Title 22 of this code.

"**Relative compaction**" (SWRCB) means the degree of compaction achieved, as a percentage of the laboratory compaction, in accordance with accepted civil engineering practices.

"**Removal**" (CIWMB) means the act of taking solid wastes from the place of waste generation either by an approved collection agent or by a person in control of the premises.

"**Removal Frequency**" (CIWMB) means frequency of removal of solid wastes from the place of waste generation either by an approved collection agency or by the owner of the waste, or frequency of removal of recyclables at facilities which separate recyclables from the waste stream.

"**Rubbish**" (CIWMB) includes non putrescible solid wastes such as ashes, paper, cardboard, tin cans, wood, glass, bedding, crockery, plastics, rubber by products or litter.

"**Run-off**" (SWRCB) means any precipitation, leachate, or other liquid that drains from any part of a waste management unit (Unit).

"**Run-on**" (SWRCB) means any precipitation or other liquid that drains onto any part of a waste management unit.

"**RWQCB**" or "Regional Water Quality Control Board" (**RWQCB**) has the same meaning as does the latter term, as described under Division 7 of the California Water Code.

"**RWQCB-Permitted Area**" (SWRCB) (as capitalized) means the portion of land designated in WDRs for the discharge of waste at a waste management unit.

"**Salvaging**" (CIWMB) means the controlled removal of waste material for utilization.

"**Saturated zone**" (SWRCB) means an underground zone in which all openings in and between natural geologic materials are filled with water.

"**Scavenging**" (CIWMB) means the uncontrolled and/or unauthorized removal of solid waste materials, or recyclable material at a solid waste facility.

"**Semi solid waste**" (SWRCB) means waste containing less than 50 percent solids.

"**Sensitive biological receptor of concern**" (SWRCB) means a member of any species of organism whose members are likely to be exposed to a release from a waste management unit and experience some measurable adverse effect as a result of that exposure.

"**Septic Tank Pumpings**" (CIWMB) include sludge and wastewater removed from septic tanks.

"**Shredding**" (CIWMB) includes a process of reducing the particle size of solid wastes through use of grinding, shredding, milling or rasping machines. Shredding for the purposes of this Division does not apply to shredding of waste tires.

"**Site Specific**" (CIWMB) means specific to the local site.

"**Slope Failure**" (SWRCB) means the downward and outward movement of ground slopes (e.g., natural rock, soils, artificial fills, or continuations of these materials).

"**Sludge**" (SWRCB) means residual solids and semi solids from the treatment of water, wastewater, and other liquids. It does not include liquid effluent discharged from such treatment processes.

"**Soil Engineer**" (CIWMB) is synonymous with geotechnical engineer; means a registered civil engineer that is qualified to use the title of "soil engineer," pursuant to California Code of Regulations, Title 16, section 426.50.

"**Soil pore liquid**" (SWRCB) means the liquid contained in openings between particles of soil in the unsaturated zone.

"**Solid Waste Management**" (CIWMB) includes a planned program for effectively controlling the generation, storage, collection, transportation, processing and reuse, conversion or disposal of solid wastes in a safe, sanitary, aesthetically acceptable, environmentally sound and economical manner. It includes all administrative, financial, environmental, legal and planning functions as well as the operational aspects of solid waste handling, disposal and resource recovery systems necessary to achieve established objectives.

"**Sorbent**" (SWRCB) means a substance which takes up and holds a liquid either by absorption or adsorption.

"**Special Waste**" (CIWMB) means "special waste" as defined in Title 22.

"**State Minimum Standards**" (CIWMB) means the following sections of this Subdivision for the purposes of implementing Public Resources Code Section 44104: 20510 to 20701, 20710 to 20937, 21100 to 21200, 21430 and 21600.

"**State Water Resources Control Board**" **—** see "SWRCB"

"**Static Conditions**" (SWRCB) means under conditions of no external motions or forces, such as those of earthquakes.

"**Statistically significant**" (SWRCB) means a statistical test has a p value that is small enough for the null hypothesis to be rejected.

"**Storage**" (SWRCB) means the holding of waste or recyclable materials for a temporary period, at the end of which the materials either is treated or is discharged elsewhere.

"**Store**" (CIWMB) means stockpile, accumulate for later use or discard. *[Note: this standard does not apply to waste tires.]*

"**Storm**" (SWRCB) means the maximum precipitation for a given duration that is expected during the given recurrence interval *[e.g., a 24-hour (duration) 100 year (recurrence interval) storm]*.

"**Surface impoundment**" (SWRCB) means a waste management unit which is a natural topographic depression, excavation, or diked area, which is designed to contain liquid wastes or wastes containing free liquids, and which is not an injection well.

"**SWRCB**" (SWRCB) means the State Water Resources Control Board, as described under Division 7 of the Water Code.

"**Synthetic liner**" **—** see "geosynthetic(s)"

"**Tailings pon**d" (SWRCB) means an excavated or diked area which is intended to contain liquid and solid wastes from mining and milling operations.

"**Trace Gases**" (CIWMB) means all other organic or inorganic compounds or elements, measured at less than one percent by volume, found together with the principal gases in landfill gas, and may include vinyl cloride, benzene, hydrogen sulfide, carbon monoxide, hydrogen, mercury, etc.

"**Transmissivity**" (SWRCB) means the rate at which water of the prevailing kinematic viscosity is transmitted through a unit width of the aquifer under a unit hydraulic gradient.

"**Treatment**" (SWRCB) means any method, technique, or process designed to change the physical, chemical, or biological characteristics of waste so as to render it less harmful to the quality of the waters of the state, safer to handle, or easier to contain or manage. The term includes use of waste as a fuel, nutrient, or soil amendment.

"**Treatment zone**" (SWRCB) means a soil area of the unsaturated zone of a land treatment unit within which constituents of concern are degraded, transformed, or immobilized.

"**Underlying ground water**" (SWRCB), for the purposes of waste management unit siting criteria, includes water which rises above the zone of saturation due to capillary forces.

"**Unit**" **—** see "waste management unit"

"**Unsaturated zone**" (SWRCB) means the zone between the ground surface and the regional water table or, in cases where the uppermost aquifer is confined, the zone between the ground surface and the top of the saturated portion of the aquifer's confining layer.

"**Unstable Areas**" (CIWMB) means locations susceptible to natural or human induced events or forces which are capable of rupturing the site containment structure.

"**Uppermost aquifer**" (SWRCB) means the geologic formation nearest the natural ground surface that is an aquifer, as well as lower aquifers that are hydraulically interconnected with this aquifer.

"**Vector**" (CIWMB) includes any insect or other arthropod, rodent, or other animal capable of transmitting the causative agents of human disease, or disrupting the normal enjoyment of life by adversely affecting the public health and well being.

"**Waste constituent**" (SWRCB) means a constituent that is reasonably expected to be in or derived from waste contained in a waste management unit.

"**Waste management facility**" or "**facility**" (SWRCB) means the entire parcel of property at which waste discharge operations are conducted. Such a facility may include one or more waste management units.

"**Waste management unit**" or "**Unit**" (SWRCB) (the latter capitalized or in quotes at the beginning of a sentence) means an area of land, or a portion of a waste management facility, at which waste is discharged. The term includes containment features and ancillary features for precipitation and ainage control and for monitoring.

"**Waste pile**" (SWRCB) means a waste management unit (Unit) at which only noncontainerized, bulk, dry solid waste is discharged and piled for treatment or storage on an engineered liner system that prevents the waste from contacting the underlying land surface. The term does not include a Unit of similar construction which is used for waste disposal (such a Unit would be a landfill).

"**Water quality impairment**" (SWRCB) means degradation of the existing quality of a body of surface or ground water resulting from a release of waste constituents, waste-derived hazardous constituents, or reaction products, including but not limited to any incomplete decomposition product which could cause nuisance by odor.

"**Water Standard**" (SWRCB) (as capitalized) means the water quality protection standard under §20390.

"**WDRs**" (SWRCB) means waste discharge requirements.

"**X Bar chart**" (SWRCB) means a control chart for evaluating the process level or subgroup differences in terms of the subgroup average.

"**Zone of saturation**" (SWRCB) means the subsurface zone which extends downward from the base of the unsaturated zone in which the interstices are filled with water under pressure that is equal to or greater than atmospheric pressure. Although the zone can contain gas filled interstices (in which the gas pressure exceeds atmospheric pressure) or interstices filled with fluids other than water, it is still considered saturated.

**Authority cited: Section 1058, Water Code, Reference: Section 13172, Water Code; Section 43103, Public Resources Code.**

**Authority cited: Section 40502 Public Resources Code, Reference: Sections 40000, 40001, 40002, and 43103 and Title 40, CFR 258.2.**

## §20220. SWRCB - Nonhazardous Solid Waste. (C15: §2523)

(a) **Definition—**Nonhazardous solid waste means all putrescible and nonputrescible solid, semi solid, and liquid wastes, including garbage, trash, refuse, paper, rubbish, ashes, industrial wastes, demolition and construction wastes, abandoned vehicles and parts thereof, discarded home and industrial appliances, manure, vegetable or animal solid and semi solid wastes and other discarded waste (whether of solid or semi solid consistency); provided that such wastes do not contain wastes which must be managed as hazardous wastes, or wastes which contain soluble pollutants in concentrations which exceed applicable water quality objectives, or could cause degradation of waters of the state (i.e., designated waste).

(b) **Units That Receive—**Except as provided in §20200(d) (for liquids), nonhazardous solid waste may be discharged at any classified landfill which is authorized to accept such waste, provided that:

(1) the discharger shall demonstrate that codisposal of nonhazardous solid waste with other waste shall not create conditions which could impair the integrity of containment features and shall not render designated waste hazardous *(e.g., by mobilizing hazardous constituents)*; and

(2) the discharger shall ensure, to the maximum extent feasible, that the Unit receives only those wastes that are approved for being discharged at that Unit. *[Note: see also CIWMB §20870]*

(c) **Dewatered Sludge—**Dewatered sewage or water treatment sludge may be discharged at a Class III landfill under the following conditions, unless DTSC determines that the waste must be managed as hazardous waste:

(1) the landfill is equipped with a leachate collection and removal system (**LCRS**);

(2) the sludge contains at least 20 percent solids (by weight) if primary sludge, or at least 15 percent solids if secondary sludge, mixtures of primary and secondary sludges, or water treatment sludge; and
(3) a minimum solids to liquid ratio of 5:1 by weight shall be maintained to ensure that the codisposal will not exceed the initial moisture holding capacity of the nonhazardous solid waste. The actual ratio required by the RWQCB shall be based on site specific conditions.

(d) **Ash—**Incinerator ash may be discharged at a Class III landfill unless DTSC determines that the waste must be managed as hazardous waste.

**NOTE: Authority cited: Section 1058, Water Code. Reference: Section 13172, Water Code; Section 43103, Public Resources Code.**

## §20230. SWRCB - Inert Waste. (C15: §2524)

(a) **Defined—**Inert waste is that subset of solid waste that does not contain hazardous waste or soluble pollutants at concentrations in excess of applicable water quality objectives, and does not contain significant quantities of decomposable waste.

(b) **Units That Accept—**Inert wastes do not need to be discharged at classified Units.

(c) **WDRs Optional—**The RWQCB can prescribe individual or general WDRs for discharges of inert wastes.

**NOTE: Authority cited: Section 1058, Water Code. Reference: Section 13172, Water Code; Section 43103, Public Resources Code.**

## §20390. SWRCB - Water Quality Protection Standard (Water Standard). (C15: §2550.2)

(a) **Components & Duration —** For each Unit, the RWQCB shall establish a water quality protection standard (**Water Standard**) in the WDRs. This Water Standard shall consist of the list of constituents of concern (under §20395), the concentration limits (under §20400), and the Point of Compliance and all Monitoring Points (under §20405). This Water Standard shall apply during the active life of the Unit, the closure period, the post closure maintenance period, and during any compliance period (under §20410).

(b) **Program-Specific Water Standards —** If a discharger is conducting a detection monitoring program in conjunction with a corrective action program for a Unit [pursuant to §20385(c)], the RWQCB may establish separate Water Standards for each program.

**Note: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13263, 13267, and 13304, Water Code; Section 43103, Public Resources Code.**

## §20395. SWRCB - Constituents of Concern (COCs). (C15: §2550.3)

(a) **COCs —** For each Unit, the RWQCB shall specify in the WDRs the Constituents of Concern (COCs) to which the Water Standard (under §20390) applies. The COC list shall include all waste constituents, reaction products, and hazardous constituents that are reasonably expected to be in or derived from waste contained in the Unit.

(b) **MSW COCs —** For MSW landfills, the COC list shall include all constituents mandated under SWRCB Resolution No. 93-62.

**Note: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13263, and 13267, Water Code; Section 43103, Public Resources Code.**

## §20400. SWRCB - Concentration Limits. (C15: §2550.4)

*[Note: The special applicability of this section is described in §20380(a); see also §20080(a).]*

(a) **Proposal of Concentration Limits —** For each Constituent of Concern (**COC**) specified pursuant to §20395 (or for a solid waste constituent that is addressed by a cleanup and abatement action taken pursuant to SWRCB Resolution No. 92-49), the discharger shall propose one of the following for each medium (under §20415, including ground water, surface water, and the unsaturated zone) monitored pursuant to §20415 of this article:

(1) **Background Value —** a concentration limit not to exceed the background value of that constituent as determined pursuant to §20415(e)(10)(A);

(2) **Value Redetermined Each Time —** that the WDRs include a statement that, at any given time, the concentration limit for that COC will be equal to the background value of that constituent, as determined pursuant to §20415(e)(10)(B); or

(3) **CLGBC** — a concentration limit greater than background (**CLGB**) established pursuant to this section for a corrective action program.

(b) **Adoption of Concentration Limits —** The RWQCB shall review the proposed concentration limits and statements and shall approve, modify, or disapprove each proposed limit and each proposed statement. Upon final approval by the RWQCB, each concentration limit and each statement shall be specified in WDRs. The RWQCB shall approve more than one concentration limit for different Monitoring Points in the same medium only if:

(1) more than one background condition exists within a particular medium;

(2) the statistical method approved for a constituent uses intra well comparisons procedures; or

(3) CLGBs have been established for a corrective action program at the Monitoring Points in the zone affected by a release from the Unit.

(c) **Establishing a CLGB —** For a corrective action program, the RWQCB shall establish a CLGB [under ¶(a)(3)] only if the RWQCB finds that it is technologically or economically infeasible to achieve the background value for that constituent and that the constituent will not pose a substantial present or potential hazard to human health or the environment as long as the CLGB is not exceeded. In making this finding, the RWQCB shall consider the factors specified in ¶(d), the results of the engineering feasibility study submitted pursuant to §20425(c), data submitted by the discharger pursuant to §20425(d)(2) to support the proposed CLGB, public testimony on the proposal, and any additional data obtained during the evaluation monitoring program.

(d) **Considerations —** In establishing a CLGB for a constituent of concern, the RWQCB shall consider the following factors:

(1) potential adverse effects on ground water quality and beneficial uses, considering:

(A) the physical and chemical characteristics of the waste in the Unit;

(B) the hydrogeological characteristics of the facility and surrounding land;

(C) the quantity of ground water and the direction of ground water flow;

(D) the proximity and withdrawal rates of ground water users;

(E) the current and potential future uses of ground water in the area;

(F) the existing quality of ground water, including other sources of contamination or pollution and their cumulative impact on the ground water quality;

(G) the potential for health risks caused by human exposure to waste constituents;

(H) the potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents; and

(I) the persistence and permanence of the potential adverse effects; and

(2) potential adverse effects on surface water quality and beneficial uses, considering:

(A) the volume and physical and chemical characteristics of the waste in the Unit;

(B) the hydrogeological characteristics of the facility and surrounding land;

(C) the quantity and quality of ground water and the direction of ground water flow;

(D) the patterns of precipitation in the region;

(E) the proximity of the Unit to surface waters;

(F) the current and potential future uses of surface waters in the area;

(G) the existing quality of surface water including other sources of contamination or pollution and the cumulative impact on surface water quality;

(H) the potential for health risks caused by human exposure to waste constituents;

(I) the potential damage to wildlife, crops, vegetation, and physical structures caused by exposure to waste constituents; and

(J) the persistence and permanence of the potential adverse effects.

(e) **CLGB Ceiling —** In no event shall a CLGB for a constituent of concern exceed the lowest concentration that the discharger demonstrates and the RWQCB finds is technologically and economically achievable. No provision of this section shall be taken to allow a CLGB for a constituent of concern to exceed the maximum concentration that would be allowed under other applicable statutes or regulations *[e.g., Maximum Concentration Limits established under the federal Safe Drinking Water Act (P.L. 93 523, codified as Subchapter XII of the Public Health Service Act at 42 USC 300f, et. seq.; regulations establishing MCL's are located in 40 CFR Part 141, Subpart B), etc.]*.

(f) **Receptor Location —** For ground water, in evaluating risk pursuant to ¶(d) to any biological receptor, the risk shall be evaluated as if exposure would occur at the Point of Compliance.

(g) **Additivity —** Proposals for CLGBs shall include a demonstration that the aggregate of hazardous constituents in the environment will not result in excessive exposure to a sensitive biological receptor. In the absence of scientifically valid data to the contrary, theoretical risks from chemicals associated with the release from the Unit shall be considered additive across all media of exposure, and shall be considered additive for all chemicals having similar toxicological effects or having carcinogenic effects.

(h) **Applicability —** A CLGB may only be applied during corrective action, or during detection monitoring following corrective action, at Monitoring Points at which "measurably significant" (see §20164) evidence of the release has been determined.

(i) **Decreasing the CLGB —** When a detection monitoring program incorporating a CLGB is reinstated after a corrective action program has been terminated, each CLGB shall be re evaluated during each review of WDRs or at least every five years. If the RWQCB, upon re evaluation, determines that the concentration of a constituent of concern in ground water, surface water, or the unsaturated zone is lower than its associated concentration limit by a "measurably significant" (see §20164) amount, the concentration limit for that constituent shall be lowered to reflect current water quality.

**Note: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13263, and 13267, Water Code; Section 43103, Public Resources Code.**

## §20405. SWRCB - Monitoring Points and the Point of Compliance. (C15: §2550.5)

(a) For each Unit, the RWQCB shall specify in the WDRs the Point of Compliance at which the Water Standard (of §20390) applies. The Point of Compliance is a vertical surface located at the hydraulically downgradient limit of the Unit that extends through the uppermost aquifer underlying the Unit. For each Unit, the RWQCB shall specify Monitoring Points (as defined in §20164) along the Point of Compliance, and shall specify additional Monitoring Points at locations determined pursuant to §20415(b-d) at which the Water Standard under §20390 applies and at which monitoring shall be conducted.

(b) If the facility contains contiguous Units and monitoring along a shared boundary would impair the integrity of a containment or structural feature of any of the Units, the Point of Compliance may be located at the hydraulically downgradient limit of an area described by an imaginary line along the outer boundary of the contiguous Units. This provision only applies to contiguous Units that have operated or have received all permits necessary for construction and operation before 7-1-91.

**Note: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13263, and 13267, Water Code; Section 43103, Public Resources Code.**

## §20410. SWRCB - Compliance Period. (C15: §2550.6)

(a) The RWQCB shall specify in WDRs a compliance period for each Unit. The compliance period is the number of years equal to the active life of the Unit (including any waste management activity prior to the adoption of the WDRs) plus the closure period. The compliance period is the minimum period of time during which the discharger shall conduct a water quality monitoring program subsequent to a release from the Unit.

(b) The compliance period begins anew each time the discharger initiates an evaluation monitoring program (under §20425).

(c) If the discharger is engaged in a corrective action program at the scheduled end of the compliance period specified under ¶(a), the compliance period shall be extended until the discharger can demonstrate that the Unit has been in continuous compliance with its Water Standard (under §20390) for a period of three consecutive years.

**Note: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13263, and 13267, Water Code; Section 43103, Public Resources Code.**

## § 20690. CIWMB - Alternative Daily Cover. (T14:§17682, 17258.21(b))

(a) **General Requirements**

(1) Alternative materials of alternative thickness for daily cover (other than at least six inches of earthen material) for municipal solid waste landfill units may be approved by the EA with concurrence by the CIWMB, if the owner or operator demonstrates that the alternative material and thickness control vectors, fires, odors, blowing litter, and scavenging without presenting a threat to human health and the environment.

(2) Alternative daily cover alone, or in combination with compacted earthen material, shall be placed over the entire working face at the end of each operating day or at more frequent intervals to control vectors, fires, odors, blowing litter, and scavenging without presenting a threat to human health and the environment. For the purposes of this section, the operating day shall be defined as the hours of operation specified in the solid waste facility permit, and may extend for more than 24 hours if operations are continuous.
(3) Should the application of alternative daily cover become impracticable or contribute to conditions hazardous to public health and safety and the environment, the owner or operator shall terminate such use and revert to the use of compacted earthen cover material in accordance with §20680. For the purposes of this section, impracticable conditions are those which make placement of alternative daily cover difficult due to adverse climatic or other conditions such that the performance requirements of ¶(a)(2) cannot be met.
(4) The owner or operator shall place compacted earthen material over the entire working face at the end of any operating day preceding a period of time greater than 24 hours when the facility is closed, unless procedures as required by the EA are in place to ensure that the requirements of ¶(a)(2) and (a)(3) are met. A stockpile of earthen cover material and required equipment shall be available to ensure a corrective response to violation of ¶(a)(2) and (a)(3).
(5) The owner or operator shall maintain a record of waste derived alternative daily cover in accordance with Title 14, California Code of Regulations, §18800 et. seq., with the addition of type and quantity of each waste derived alternative daily cover material applied as cover. The records shall be available for inspection by authorized representatives of the EA, the local health agency, and the CIWMB during normal business hours and retained in the operating record near the site or in an alternative location approved by the EA.
(6) For waste classification, composition, and liquid percolation requirements of alternative daily cover, refer to the SWRCB requirements set forth in §20705.
(7) Waste derived materials used as alternative daily cover shall be restricted to quantities no more than necessary to meet the performance requirements of ¶(a)(2), or as specified in subdivision (b) of this section.
(8) Compost, co-compost, and chemically fixed sewage sludge, that meet the performance standards for cover material, shall be limited to up to 25 percent of landfill cover materials or landfill cover extenders as required under Public Resources Code (PRC) 42245. For the purposes of this section, "chemically fixed sewage sludge" means solid and semisolid residue generated during the treatment of domestic sewage. The 25 percent limit shall apply on a quarterly basis to the total daily and intermediate cover or cover extender use. For the purposes of this section, landfill cover extenders shall mean compost, co-compost, or chemically fixed sewage sludge blended or mixed with soil.
(9) Storage and handling of waste derived materials at the landfill for use as alternative daily cover shall be conducted in a manner to protect public health and safety and the environment, and control vectors, fires, odors, and nuisances.
(10) The EA shall apply this section to disposal facilities other than municipal solid waste landfill units as necessary to control vectors, fires, odors, blowing litter, and scavenging without presenting a threat to human health and the environment. This requirement shall also apply to municipal solid waste landfills which qualify for a delay in the general compliance date or additional flexibility as specified in 40 CFR Part 258.

(b) **Specific Requirements**

*Proposed uses of alternative daily cover materials not specified in ¶(b)(1) through (10) shall be subject to site specific demonstration projects approved by the EA with concurrence by the CIWMB to establish suitability as daily cover. Site specific demonstration projects are not required for the following materials used as specified and in accordance with subdivision (a) of this section.*

(1) **Geosynthetic Fabric or Panel Products (Blankets)**

(A) Geosynthetic blanket products shall be removed from the waste and the waste shall be covered with new waste or approved cover materials within 24 hours of product placement, unless the product is intended to be nonreusable, or has been approved by the EA for continuous use beyond 24 hours.

(2) **Foam Products**

(A) Foam products shall not be applied when there is precipitation or when there is a local forecast of greater than 40% chance of precipitation within 8 hours of application time in the vicinity of the landfill.

*(B) Foam products shall be covered with waste or other approved cover materials within 72 hours of application, unless a shorter time period is required by the EA to meet the requirements of ¶(a)(2) and (a)(3) of this section.*

(3) **Processed Green Material**

(A) Processed green material shall be green material as defined in Title 14, California Code of Regulations, §17852(u) with the exclusion of manure. Processed green material may include varying proportions of wood waste from urban and other sources and shall be ground, shredded, screened or otherwise processed in a manner to provide a compacted material free of open voids when applied to meet the performance requirements as alternative daily cover.

(B) Processed green material shall be restricted to a minimum compacted thickness of 6 inches and average compacted thickness of less than or equal to 12 inches.

(C) Processed green material placed as cover shall not be exposed for greater than 21 days.

(4) **Sludge and Sludge-Derived Materials**

(A) Public contact with sludge or sludge-derived materials, either alone or blended with soil, ash, processed green material, or stabilization agents such as lime, lime kiln dust, or cement kiln dust, shall be prohibited. This prohibition shall apply to staging, processing, tipping, and cover placement areas.

(B) Sludge or sludge-derived materials, either alone or blended with soil, processed green material, ash, or stabilization agents such as lime, lime kiln dust, or cement kiln dust, shall form a compacted material which can be placed without forming open voids or causing material to be tracked off the working face area.

(5) **Ash and Cement Kiln Dust Materials**

(A) Ash and Cement Kiln Dust, either alone or blended with earthen material or stabilization agents, shall form a compacted material which can be placed without forming open voids or causing material to be tracked off the working face area. For the purposes of this section ash means the nonhazardous residue from the combustion of material or the hazardous residue which may be managed as a nonhazardous waste in accordance with Title 22 California Code of Regulations sections 66260.200(f) or 66260.210.

(B) Ash and Cement Kiln Dust, either alone or blended with earthen material or stabilization agents shall be used as alternative daily cover in a manner to minimize the creation of dust.

(C) Ash and Cement Kiln Dust, either alone or blended with earthen material or stabilization agents, shall be restricted to a minimum compacted thickness of 6 inches and average compacted thickness of less than 18 inches.

(6) **Treated Auto Shredder Waste**

(A) Auto shredder waste shall be treated pursuant Title 22, California Code of Regulations, section 66268.106(a)(1).

(B) Treated auto shredder waste used for alternative daily cover shall be restricted to a minimum compacted thickness of 6 inches and average compacted thickness of less than 24 inches.

(7) **Contaminated Sediment, Dredge Spoils, Foundry Sands, Energy Resource Exploration and Production Wastes**

(A) Contaminated sediment, dewatered dredge spoils, foundry sands, or processed energy resource exploration and production wastes shall be restricted to a minimum compacted thickness of 6 inches and average compacted thickness of less than 18 inches. Such materials shall form a compacted material which can be placed without forming open voids or causing material to be tracked off the working face area.

(8) **Compost Materials**

(A) Except as provided in ¶(b)(8)(B), of this section, compost shall meet the environmental health standards of Title 14, California Code of Regulations, Division 7, Chapter 3.1, Article 7.

(B) Public contact shall be precluded from cover staging, processing, tipping, and placement areas for compost which does not meet the environmental health standards of Title 14, California Code of Regulations, Division 7, Chapter 3.1, Article 7.

(9) **Construction and Demolition Wastes**

(A) Construction and demolition wastes shall be restricted to crushed, ground, or screened materials alone or mixed with soil to provide a compacted material free of open voids.

(B) Construction and demolition wastes shall be restricted to a minimum compacted thickness of 6 inches and average compacted thickness of less than 18 inches.

(10) **Shredded Tires**

(A) Shredded tires used as daily cover alone or mixed with soil shall be shredded such that 50% by volume is smaller than 6 inches in length and no individual pieces are greater than 12 inches in length.

(B) Shredded tires used as alternative daily cover without admixed soil shall not be applied when there is precipitation or when there is a local forecast of greater than 40% chance of precipitation within 8 hours of application time in the vicinity of the landfill.

**Note: Authority cited: Section 40502, 41781.3, 43020, 43021, 43030 and 43103 Public Resources Code. Reference: Sections 40508, 42245, 43020 and 43021 Public Resources Code; and Code of Federal Regulations Section 258.21.**

## §20705. SWRCB - Standards for Daily and Intermediate (Interim) Cover. (C15: §2544)

*[Note: This section applies in conjunction with CIWMB sections 20680-20701 and addresses cover issues prior to the installation of the final cover. Readers interested in the SWRCB-promulgated requirements for final cover will find them at §21090.]*

(a) **Daily & Intermediate —** Interim cover at landfills is "daily cover" and "intermediate cover" as defined by the CIWMB (see §20164).

(b) **Minimize Percolation —** Interim cover over wastes discharged to a landfill shall be designed and constructed to minimize percolation of liquids through wastes.

(c) **For Class II Waste Piles —** Cover may be required by RWQCBs for Class II wastes piles.

(d) [Reserved]

(e) **Limitations On Cover Materials —** Except for reusable covers that are never incorporated into the Unit, daily and intermediate cover shall only consist of materials:

(1) **Match Unit Classification —** which meet the classification criteria for wastes that can be discharged to that landfill. Therefore, a material that would be classified as a designated waste cannot be utilized for daily or intermediate cover at a Class III landfill unless that material is approved for discharge (as a waste) to that landfill pursuant to §20200(a)(1); and

(2) **Composition —** whose constituents (other than water) and foreseeable breakdown byproducts, under the chemical (including biochemical) and temperature conditions which it is likely to encounter within the landfill, either:

(A) for non-composite lined portions of the Unit, are mobilizable only at concentrations which would not adversely affect beneficial uses of waters of the state, in the event of a release; or

(B) for composite-lined portions of the Unit, are listed as COCs in the Unit's water quality protection standard (Water Standard), created pursuant to §20395.

(f) **Dust Control —** The requirements of §21090(a)(5) regarding the discharge of leachate, gas condensate, and other liquids to final-covered portions of the Unit also apply to the discharge of liquids to daily and intermediate cover, including discharges made for the purpose of dust control.

**NOTE: Authority cited: Section 1058, Water Code; Reference: Sections 13172 and 13360, Water Code; Section 43103, Public Resources Code.**

## §20950. SWRCB - General Closure and Post-Closure Maintenance Standards Applicable to Waste Management Units (Units) for Solid Waste. (C15: §2580)

*[Note: For landfills, see also §21790 et seq.]*

(a) **General.**

(1) **Applicability —** Dischargers who are implementing final closure of a new or existing classified solid waste management unit (Unit) or are implementing complete final closure of a portion of a solid waste landfill [incremental closure under §21090(b)(1)(D)] shall comply with the provisions of this article. The discharger shall carry out both mandatory closure (under §22190) and normal closure (e.g., at the end of the active life of the Unit) in accordance with a closure and post-closure plan (under §21769) which the RWQCB finds meets all applicable requirements that section and of this Subchapter, including but not limited to applicable performance standards under ¶(a)(2). For the purposes of the RWQCB, the final closure plan the discharger submits under this section constitutes an amendment to the report of waste discharge (under §21750). If a portion of a Unit was completely closed in accordance with an approved closure plan by November 27, 1984, the cover over the closed portion does not need to be modified to conform to the SWRCB's additional closure requirements in these regulations, unless monitoring data indicate impairment of beneficial uses of ground water. Classified Units shall be closed according to an approved closure and post closure maintenance plan which provides for continued compliance with the applicable SWRCB-promulgated standards for waste containment and precipitation and drainage controls in Article 4, Subchapter 2, Chapter 3 of this subdivision (§20310 et seq.), and the monitoring program

requirements in Article 5, Subchapter 2, Chapter 3 of this subdivision (§20380 et seq.), throughout the closure period and the post closure maintenance period. Relative to the applicable SWRCB-promulgated requirements of this title, the post closure maintenance period shall extend as long as the wastes pose a threat to water quality; for Units concurrently regulated by the RWQCB and by other state agencies (including the agents of such agencies), the RWQCB's finding that the waste in the Unit no longer poses a threat to water quality shall release the discharger only from the need to comply with the SWRCB-promulgated portions of this title, for that Unit. For land treatment facilities, relative only to the applicable SWRCB-promulgated requirements of this title, the post-closure maintenance period shall extend until treatment is complete.

(2) **Performance Standards —** The performance standards applicable to closure of a Unit and, for Units that are not clean-closed, to post-closure maintenance at the Unit are as follows:

(A) **Unit Closed as a Landfill —** for landfills that are not clean-closed and for waste piles and surface impoundments that are closed as a landfill:

1. **Closure —** for landfills and for waste piles and surface impoundments closed as landfills, the goal of closure, including but not limited to the installation of a final cover, is to minimize the infiltration of water into the waste, thereby minimizing the production of leachate and gas. For such Units, after closure, the final cover constitutes the Unit's principal waste containment feature; and

2. **Post-Closure Maintenance —** the goal of post-closure maintenance at such Units is to assure that the Unit continues to comply with the performance standard of ¶(a)(2)(A)1. until such time as the waste in the Unit no longer constitutes a potential threat to water quality;

(B) **Unit Clean-Closed —** for Units that are clean-closed, the goal of closure is to physically remove all waste and contaminated materials from the Unit and from its underlying and surrounding environs, such that the waste in the Unit no longer poses a threat to water quality. Successful completion of clean-closure eliminates the need for any post-closure maintenance period and removes the Unit from being subject to the SWRCB-promulgated requirements of this subdivision; and

(C) **LTUs —** for land treatment units (**LTUs**):

1. **Closure —** the goal of closure is to initiate the post-closure maintenance period;

2. **Post-Closure Maintenance —** the goal of post-closure maintenance is to continue Unit operations, without discharging additional waste to the Unit, in a manner which maximizes the degradation rate of the waste remaining within the treatment zone.

(b) **Closure Supervision —** Closure shall be under the direct supervision of a registered civil engineer or a certified engineering geologist.

(c) **Unit Type —** Class II Units and Class III landfills shall be closed in accordance with one of the following options:

(1) **landfill:** pursuant to §21090;
(2) **surface impoundment:** pursuant to §21400;
(3) **waste pile:** pursuant to §21410; or
(4) **land treatment:** pursuant to §21420.

(d) **Surveying Monuments —** Closed Units shall be provided with at least two permanent monuments installed by a licensed land surveyor or a registered civil engineer, from which the location and elevation of wastes, containment structures, and monitoring facilities can be determined throughout the post closure maintenance period.

(e) **Vegetation —** For landfills and for waste piles and surface impoundments that are closed as landfills, all vegetation for the closed Unit's vegetative cover layer shall meet the requirements of §21090(a)(3)(A)1. [in cases where the Unit does not utilize the mechanically erosion resistant layer of §21090(a)(3)(A)2.].

(f) **Closure/Post-Closure Financial Assurance —** The RWQCB shall require the discharger to establish an irrevocable fund (or to provide other means) for closure and post-closure maintenance (see Articles 1 & 2 of Chapter 6 of this subdivision) to ensure closure and post closure maintenance of each classified Unit in accordance with an approved plan. *[Note: corrective action financial assurance standards continue to apply throughout closure and post-closure maintenance {see §20380(b) & §22222.}]* For landfills required by the CIWMB to have financial assurance mechanisms under Chapter 6, the RWQCB shall assist the CIWMB:

(1) by verifying the amount of coverage proposed by the discharger to meet applicable SWRCB-promulgated requirements of this subdivision *[Note: the CIWMB is responsible for the review, approval, and management of the financial assurance mechanisms for such Units]*; and

(2) by participating in the CIWMB's periodic review of the adequacy of financial assurance mechanisms, and in any enforcement action that such review reveals, as necessary.
**NOTE: Authority cited: Section 1058, Water Code. Reference: Section 13172, Water Code; Section 43103, Public Resources Code.**

## §21730. SWRCB - Public Participation. (C15: §2592)

(a) **Notification Of Interested Parties —** To ensure adequate public participation in any RWQCB proceeding relating to land disposal of wastes, the following persons and entities shall receive individual notice of any public hearing or board meeting either involving the classification of Units or involving the issuance or revision of WDRs for classified Units subject to this division:
(1) the discharger and responsible public agencies;
(2) news media serving the county as well as communities within five miles of the Unit;
(3) citizens groups representing local residents;
(4) environmental organizations in affected counties;
(5) interested industrial organizations; and
(6) for an MSW landfill at which a release has migrated beyond the facility boundary, any persons requiring notification pursuant to SWRCB Resolution No. 93 62 [see 40CFR258.55(g)(1)(iii)].

(b) **Notice Requirements —** Notice of hearings or meetings related to Units, or to discharges subject to this division, shall be given not less than 45 days before the meeting at which such actions will be taken, and copies of the agenda package shall be available not less than 30 days before the meeting. Nevertheless:
(1) enforcement actions involving releases of hazardous wastes can be taken at meetings which comply only with the shorter (10-day) notice requirements of the California State Body Open Meetings Act; and
(2) emergency actions [as described in §647.2(d) Government Code)] taken by the RWQCB are exempt from public participation and notice requirements.

(c) **Public Input Regarding a Proposed Corrective Action Program —** Regarding the adoption of corrective action measures for an MSW landfill, including any hearing preparatory to such adoption, the RWQCB shall meet the federal requirements incorporated by reference into SWRCB Resolution No. 93-62 [i.e., see §258.56(c & d) and §258.57 of 40CFR258].
**NOTE: Authority cited: Section 1058, Water Code. Reference: Sections 13172, 13260 and 13302, Water Code; Section 43103, Public Resources Code.**

## §21760. SWRCB - Design Report and Operations Plan. (C15: §2596)

(a) **Design Report.**
(1) **Preliminary and As-Built Plans —** As part of the report of waste discharge ("**ROWD**", including any such report integrated into a Joint Technical Document, pursuant to §21585), dischargers who own or operate classified waste management units (**Units**) shall submit, for each such Unit, detailed preliminary and (later, after completion) as built plans, specifications, and descriptions for all liners (under §20330) and other containment structures *(e.g., final cover, under §21090)*, leachate collection and removal system components (under §20340), leak detection system components [under §20415(b-d)], precipitation and drainage control facilities (under §20365), and interim covers installed or to be installed or used (under §20705). In addition, the ROWD shall contain a description of, and location data for, ancillary facilities including roads, waste handling areas, buildings, and equipment cleaning facilities, only insofar as the location and operation of these ancillary facilities could have an effect upon water quality.
(2) [Reserved.]
(3) **Monitoring System Plans and Rationale —** Dischargers shall submit detailed plans and equipment specifications for compliance with the ground water and unsaturated zone monitoring requirements of Article 1, Subchapter 3, Chapter 3, Subdivision 1 of this division (§20380 et seq.). Dischargers shall provide a technical report which includes rationale for the spatial distribution of ground water and unsaturated zone monitoring facilities, *[e.g., the location and design of Monitoring Points and Background Monitoring Points for each monitored medium under §20415(b-e)]*, and for the selection of other monitoring equipment. This report shall be accompanied by the following information, which shall be updated throughout the Unit's active life, closure period, and post-closure maintenance period as needed to reflect the as-built system:

(A) **Map —** a map showing the locations of proposed monitoring facility components; and

(B) **Plans & Specifications —** drawings and data showing construction details of proposed monitoring facilities. These data shall include:

1. casing and test hole diameter;
2. casing materials (PVC, stainless steel, etc.);
3. depth of each test hole;
4. the means by which the size and position of perforations shall be determined, or verified, in the field;
5. method of joining sections of casing;
6. nature of filter material;
7. depth and composition of seals;
8. method and length of time of development; and

(C) **Unsaturated Zone Monitoring —** specifications, drawings, and data for location and installation of unsaturated zone monitoring equipment.

(4) **Inspection Procedures —** Dischargers shall submit proposed construction and inspection procedures for the Unit [including, after July 18, 1997, a CQA Plan under §21710(a)(5)] to the RWQCB for approval.

(b) **Operation Plans —** Dischargers shall submit operation plans describing those Unit operations which could affect water quality, including but not limited to:

(1) a description of proposed treatment, storage, and disposal methods;

(2) contingency plans for the failure or breakdown of waste handling facilities or containment systems, including notice of any such failure, or any detection of waste or leachate in monitoring facilities, to the RWQCB, local governments, and water users downgradient of Units; and

(3) a description of inspection and maintenance programs which will be undertaken regularly during disposal operations and the post closure maintenance period.

**NOTE: Authority cited: Section 1058, Water Code. Reference: Section 13360, Water Code; Section 43103, Public Resources Code.**